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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|--|-------------|--|---------------------|-----------------------|
| 10/564,767 | 07/19/2006 | Joannes Josephus Henricus Marie Gorris | P71037USO | 1478 |
| 136 | 7590 | 09/04/2007 | | EXAMINER |
| JACOBSON HOLMAN PLLC 400 SEVENTH STREET N.W. SUITE 600 WASHINGTON, DC 20004 | | | | MUROMOTO JR, ROBERT H |
| | | | ART UNIT | PAPER NUMBER |
| | | | 3765 | |
| | | | | MAIL DATE |
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

| | | | |
|------------------------------|-------------------------|---------------------|--|
| Office Action Summary | Application No. | Applicant(s) | |
| | 10/564,767 | GORRIS ET AL. | |
| | Examiner | Art Unit | |
| | Robert H. Muromoto, Jr. | 3765 | |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) Responsive to communication(s) filed on 17 January 2006.
 2a) This action is **FINAL**. 2b) This action is non-final.
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) Claim(s) 1-21 is/are pending in the application.
 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
 5) Claim(s) _____ is/are allowed.
 6) Claim(s) 1-7 and 9-21 is/are rejected.
 7) Claim(s) 8 is/are objected to.
 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) The specification is objected to by the Examiner.
 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

| | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date <u>4/27/2006</u> | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Priority

Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

Specification

The abstract of the disclosure is objected to because the form and legal phraseology often used in patent claims, such as "means" and "said," should be avoided and it should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

Correction is required. See MPEP § 608.01(b).

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 12 and 13 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Both claims recite, "for example", this phrase is confusing and does not clearly recite what the claim is actually claiming. In claim 12 'plastic' and 'foil' in claim 13 are not being considered as required limitations due to the ambiguousness of the term "for example".

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-4, 9-15 and 17-21 are rejected under 35 U.S.C. 102(b) as being anticipated by Cyvas US patent 4,187,887.

‘887 discloses, “a projectile for the insertion of filling yarns in a loom, wherein the filling yarn is supplied from supply packages located outside of the loom. The invention is particularly directed to a projectile of the type in which at least a portion of the filling yarn is stored in a filling storage chamber within the projectile.”

The stored yarn, is equivalent to the recited “yarn clew”.

The weft yarn is inherently ‘fixed’ as in claim 2 during the known beat up stage of all weaving processes.

“A further object of the present invention (to ‘887) is the provision of a loom projectile having a filling storage chamber in which the filling yarn is deposited within the chamber in uniform lengths progressively from the interior of the chamber toward the inlet opening to permit smooth and even withdrawal of the filling.” The uniform lengths limitation would result in the stored yarn (clew) having a “consistent shape” as claimed.

The projectile in '887 uses air to force the weft yarn against an outlet opening towards the front end of the projectile. This action serves as a gripping element, as recited in claim 3.

The projectile 10 is equivalent to claimed 'carrier' in claim 9 and 11.

The stored yarn in the projectile 10 is shown in uniform coils (windings) as in claims 10 and 20.

The projectile is recited as a hollow, cylindrical annular member. This member would inherently have some degree of flexibility and rigidity as claimed since no degree of flexibility or rigidity is recited.

The operation of '887 clearly discloses the limitations of claims 14, 15, and 17. '887 discloses an embodiment for use "in a loom where filling picks are inserted from only one side of the loom. In looms of this type, the projectile is picked from one side, boxed on the opposite side and then conveyed back to the side where it was picked. Because of this, several projectiles are used during the course of weaving.", as recited in claims 18, 19 and 21.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 5-7 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over '887 in view of Illman et al. US patent 4,253,840.

Although '887 discloses the limitations above, '887 does not recite the use of a bonding agent (glue, wax) or the insertion fluid medium being water.

However, '840 does teach, "the primary purpose of any textile warp size is of course to enhance the capacity for weaving or knitting of the yarn to which it is applied. Today's high-speed looms and knitting machines demand lubricity, flexibility, **adherence to yarn**, toughness, and other size characteristics for surpassing those of earlier machines. Faster moving loom parts which contact the yarns, such as **shuttles and filling yarn projectiles**, as well as **the faster moving filling** **yarns which they carry through the warp yarns, or shed, likewise impose** **increasingly stricter requirements upon warp sizes**. "

Therefore it would have been obvious to one of ordinary skill in the art to use textile warp sizes such as the adhesives or waxes taught by '840 on weft yarns to provide the weft yarns with greater adherence and toughness to add to a weaving machines capacity as is already done on warp yarns in prior art weaving processes.

As for the 'water jet' weaving limitation water jet weaving is a well-known weft insertion fluid variant as evidence the examiner cites '840, "Warp yarns in the present invention (to '840) are inclusive of both filament and spun yarns. And although of greatest value for preparing yarns for weaving, on both conventional looms and the newer high-speed Sulzer, water-jet, and air-jet looms, the yarns of the invention are also intended for use in knitting, especially warp knitting."

Therefore it would have been an obvious variant to one of ordinary skill in the art of fluid jet weaving to modify an air-jet system to the well known variation known as water jet weft insertion as is well known practice in the art of fluid jet weaving.

Allowable Subject Matter

Claim 8 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claim 8 would be allowable because it recites the use of ice as a bonding agent of a weft yarn clew. Nothing in the prior art teaches the use of ice as a bonding agent for packed weft yarn clews as instantly recited.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Robert H. Muromoto, Jr. whose telephone number is 571-272-4991. The examiner can normally be reached on 8-530, M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gary Welch can be reached on 571-272-4996. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Bobby Muromoto
/Bobby Muromoto/
Patent examiner (partial signatory authority)
Art unit 3765
August 27, 2007